part of the working library of every careful taxonomist. In its general concept and spirit it may well serve as a model for future systematic research.

H. A. GLEASON

NEW YORK BOTANICAL GARDEN

A new one-volume encyclopedia for gardeners1

All growers and lovers of plants will find this volume a treasure house of information. Every variety of plant cultivated in the United States for ornament or for food, as well as most others of economic importance and a large number of native wild flowers, trees and shrubs are given a place here. Arranged alphabetically, the plants are listed under both common and scientific names. For each plant there is a description concise but complete enough, especially as many are illustrated by excellent line drawings, following this are directions for cultivation, lists of fungus and insect enemies with methods of control, and brief descriptions of the species or varieties in cultivation.

Little is said of the parts of the country where different plants may be expected to grow, mention being made merely to hardy or not hardy north, needs much or little water, acid or alkaline soil, etc. Most of the book is of course taken up with descriptions of plants, but besides there are articles on almost any topic the gardener may desire to know about: injurious insects and insecticides; fungi and fungicides; special methods of propagation and culture; the construction of various types of gardens and green houses; kinds of soil and their treatment; fertilizers; dish, window and roof gardens and terraria; birds and their relation to the garden and farm; and a hundred other topics that may be of interest and value. Of birds, besides four and a half pages describing their value in the gardens and means of attracting them, nearly thirty of the more common ones of the east are briefly described in a table giving the characteristic color, markings, size, habits, habitats, nests, food and economic status. Under the last head it is said of the starling: "Highly valued as destroyer of harmful beetles and insects." Certainly there are parts of the country where the starling by

¹ The Garden Encyclopedia, edited by E. L. D. Seymour. W. H. Wise and Company, 1936. x+1300, 60 plates, numerous drawings. \$4.00

its great numbers, its attacks on fruit, and its driving off of native birds, is not "highly valued." Weeds receive a somewhat similar treatment, a large number in tabular form, as well as separate treatment of most of the more important ones.

A suggestion of temporary value is given to the encyclopedia by giving names and addresses of the secretaries of such organizations as the Cactus and Succulent Society of America, the American Iris Society and the National Plant, Flower, and Fruit Guild. Surely the volume will be of value and use long after these organizations have changed their officers.

In any volume of the size and range errors are almost unavoidable. For example: "Angelica, a genus of herbs of the Paisley Family resembling the common cow parsnip or water hemlock, a species of Delphinium (which see)." Of course, there is reference to neither cow parsnip nor poison hemlock under Delphinium. Under "Nuts" there is given a botanical description and a horticultural one—but neither corresponds with the popular meaning of the term. A short list of true nuts and so-called ones, includes the brazil nut as one of the true ones, though it is really a seed. The scientific names used are the commonly used ones, a proper conservatism in a volume of this kind. Under Yucca we find "The great Yuccas of Southern California known as 'Candles of the Lord' . . . are Y. arborescens." This name is often used as a synonym for Y. brevifolia, the Joshua-tree correctly named in the same paragraph; the "Candles of the Lord" being Y. Whipplei. The statement that "snails, except the slugs with shells reduced to the vanishing point are of no interest to gardeners," will not be appreciated in some regions, such as Southern California. But in general one must hunt through many pages to find even such slight errors.

The book is plainly bound in dark green cloth, the 60 full page plates and the more than 500 text illustrations add to the value as well as to the attractiveness of the volume.

G. T. HASTINGS